Innovations in Development: Community-Driven Projects That Adapt Technology for **Environmental Learning in Nature Preserves**

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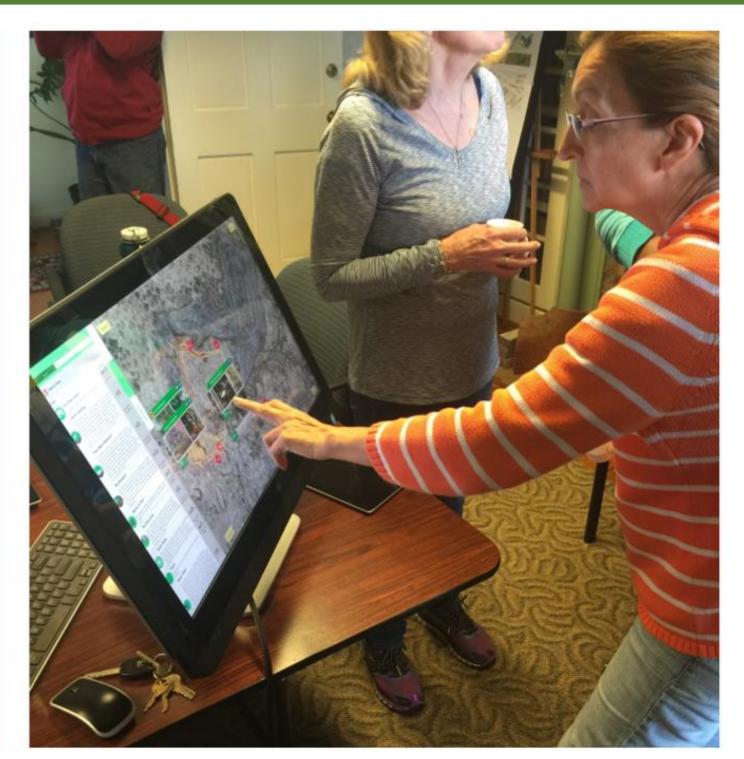
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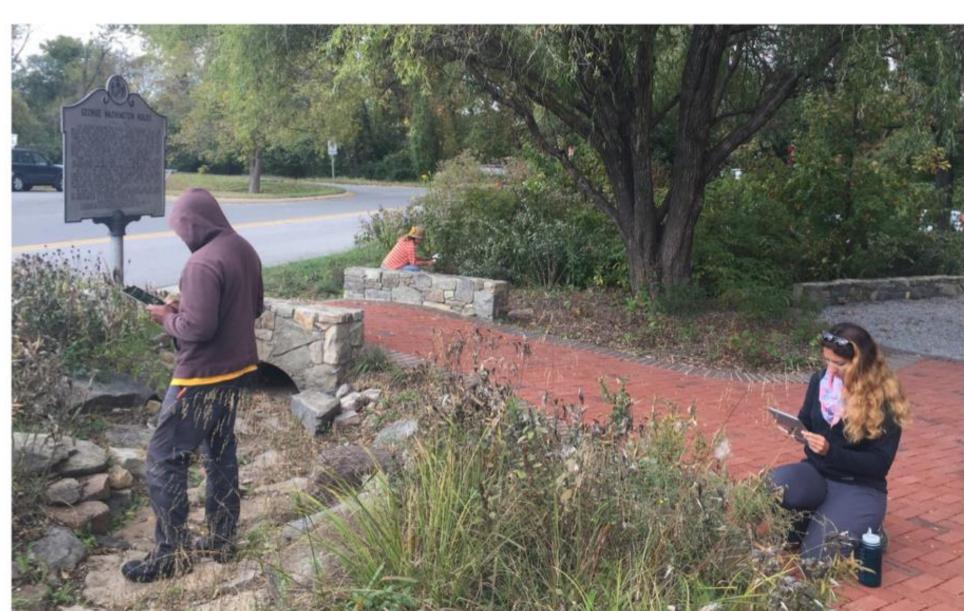
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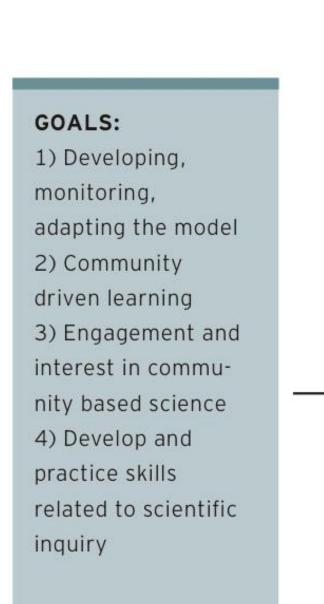
Research assistants

- 7 graduate students
- 1 undergraduate student

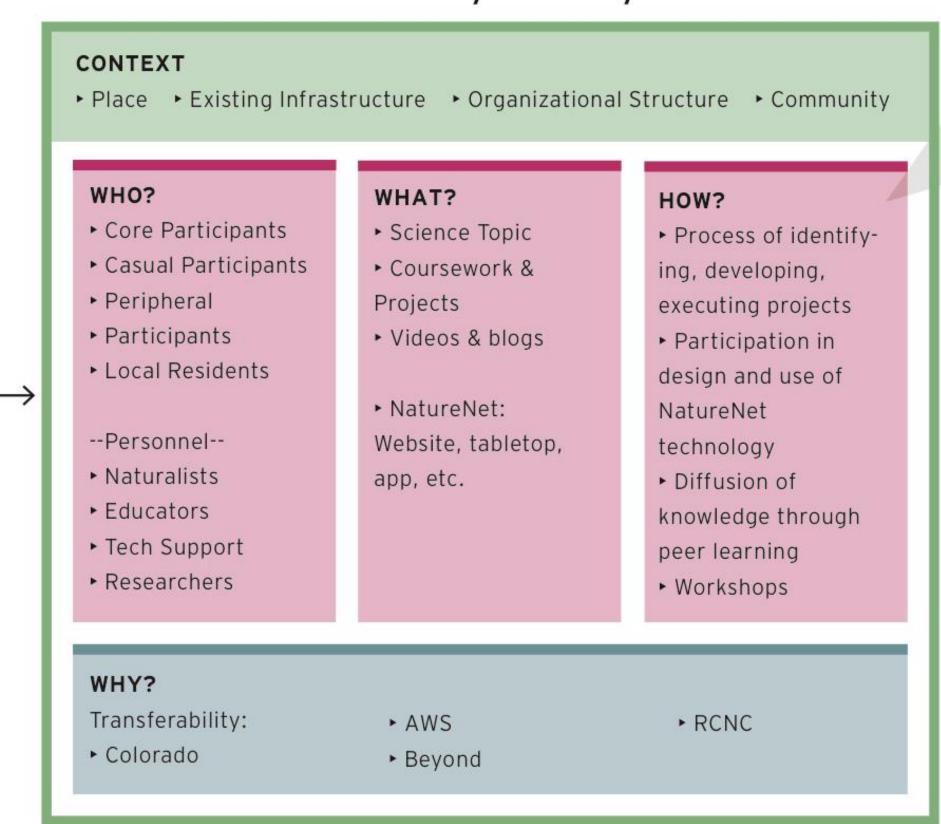




Pilot-Year Evaluation Activities Developing the C-DEP Model







OTHERS? Are there any components missing? Context, Beneficiaries, Research What about When components? Does timing matter for

OUTCOMES: 1) Engaged community in environmental 2) Community specific activities/projects 3) Community driven skills training 4) Evidence of participants' change disposition towards the environment 5) Increased diversity among participants

PARTICIPANTS PROVIDE: Participation Science Topic

RELATIONSHIPS? How do the components of other? Here's a starting

Pre-existing Resources Provide: Existing Infrastructure

Project Team Provides: Personnel Technology Training

COMPONENTS

1) Community

Infrastructure

3) Participation

5) Science Topic

6) Technology

7) Training

2) Existing

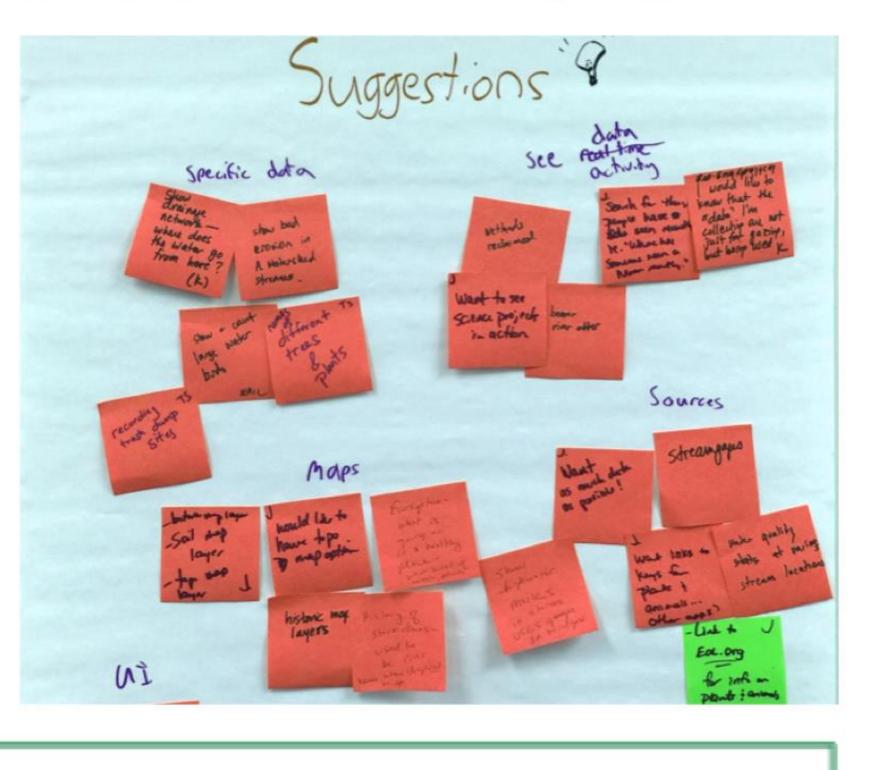
This project engages members of racially and economically diverse communities in identifying and carrying out environmental projects that are meaningful to their lives, and adapts technology known as NatureNet to assist them. NatureNet, encompassing a cell phone app, a multi-user, touch-based tabletop display and a web-based community, was developed with prior NSF support.

Main Audiences

- Diverse community members interested
- Visitors to nature preserves
- Naturalists and environmental educators

Research Goals

- Develop and test the Community-Driven Environmental Projects (C-DEP) model
- Refine NatureNet technology
- Assess participants' learning outcomes
- Compare program adaptation by each partner site
- Contribute to STEM theory and practice related to sociocultural models of community learning with technology for under-represented communities



Research Questions

- How do community-driven informal environmental learning projects impact participants, including their motivation to actively participate in science issues via technology and their disposition toward nature preserves and scientific inquiry?
- What are the key factors (e.g., demographic composition of participants, geographical location) that influence the development of community-driven environmental projects?

Insights & Challenges

- Budgeting for costly technology development
- Reaching large numbers of diverse participants while ensuring informed consent and understanding of privacy rights
- Working effectively as a distributed team
- Focusing on long-term sustainability of community partnerships